



Scott Sagan

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**Scott Sagan**  
Stanford University



**"The Problem of Redundancy Problem: Why  
More Nuclear Security Forces May Produce Less  
Nuclear Security"**

*Much attention has focused since 9/11 on the risk that terrorist organizations might someday steal or purchase nuclear materials or weapons. Most scholars and policy makers assume that increasing the number of security forces at US, Russian, and other nuclear facilities should be part of our policy response to reduce such risks. In contrast, this article argues that adding redundancy to the nuclear security system can backfire by creating hidden common-mode failures, producing social shirking, and encouraging over-compensation. Better organizational practices, not more security forces, are the best route toward increased nuclear security in a dangerous world.*

**Thursday, November 3, 2005  
12:00 p.m.  
Mershon Center  
Room 120**



Scott Sagan is a professor of political science and director of Stanford's Center for International Security and Cooperation. Before joining the Stanford faculty, Sagan was a lecturer in the Department of Government at Harvard University and served as a special assistant to the director of the Organization of the Joint Chiefs of Staff in the Pentagon. He has also served as a consultant to the office of the Secretary of Defense and at the Los Alamos National Laboratory.

Sagan is the author of *Moving Targets: Nuclear Strategy and National Security* (Princeton University Press, 1989), *The Limits of Safety: Organizations, Accidents, and Nuclear Weapons* (Princeton University Press, 1993), and with co-author Kenneth N. Waltz, *The Spread of Nuclear Weapons: A Debate Renewed* (W.W. Norton, 2002). He is the co-editor of Peter R. Lavoy, Scott D. Sagan, and James L. Wirtz, *Planning the Unthinkable* (Cornell University Press, 2000). Sagan was the recipient of Stanford University's 1996 Hoagland Prize for Undergraduate Teaching and the 1998 Dean's Award for Distinguished Teaching. As part of CISAC's mission of training the next generation of security specialists he founded Stanford's Interschool Honors Program in International Security Studies in 2000.

His recent articles include "The Madman Nuclear Alert: Secrecy, Signaling, and Safety in October 1969" co-written by Jeremi Suri and published in *International Security* in the Spring 2003; and "The Problem of Redundancy Problem: Will More Nuclear Security Forces Produce More Nuclear Security?" published in *Risk Analysis* in 2004. The first piece looks into the events surrounding a secret nuclear alert ordered by President Nixon to determine how effective the alert was at achieving the president's goal of forcing negotiations for the end of the Vietnam War. It also questions many of the assumptions made about nuclear signaling and discusses the dangers of new nuclear powers using this technique. Sagan's article on redundancy in *Risk Analysis* won Columbia University's Institute for War and Peace Studies 2003 Best Paper in Political Violence prize. His article, "Realism, Ethics, and Weapons of Mass Destruction" appears in *Ethics and Weapons of Mass Destruction: Religious and Secular Perspectives*, edited by Sohail Hashmi and Steven Lee. In this article, Sagan looks at how we should think about nuclear security and the emerging terrorist threat, specifically whether more nuclear facility security personnel increases our safety. In addition to

these works, Sagan is also finishing a collection of essays for a book tentatively entitled *A Fragile Peace: Understanding Our Nuclear History and Nuclear Future*.

Currently, his main research interests are nuclear proliferation in South Asia, ethics and international relations, and accidents in complex organizations. As a result, he is working on an annual conference on South Asia and nuclear proliferation, for which he hopes to create an edited volume of the issues and papers discussed. He also continues to participate with Working Group 1 in the Five Nation Project.